FactoryMethod Example

Documents

**Dcoument.java**

package documents;

public interface Document{

    void open();

}

**ExcelDocument.java**

package documents;

public class ExcelDocument implements Document {

    @Override

    public void open(){

        System.out.println("Opening Excel Document");

    }

}

**PdfDocument.java**

package documents;

public class PdfDocument implements Document {

    @Override

    public void open() {

        System.out.println("Opening PDF Document");

    }

}

**WordDocument.java**

package documents;

public class WordDocument implements Document{

    @Override

    public void open(){

        System.out.println("Opening Word Document");

    }

}

**Factories**

**DcoumentFactory.java**

package factories;

import documents.Document;

public abstract class DocumentFactory {

    public abstract Document createDocument();

}

**ExcelDocumentFactory.java**

package factories;

import documents.Document;

import documents.ExcelDocument;

public class ExcelDocumentFactory extends DocumentFactory {

    @Override

    public Document createDocument() {

        return new ExcelDocument();

    }

}

**PdfDocumentFactory.java**

package factories;

import documents.Document;

import documents.PdfDocument;

public class PdfDocumentFactory extends DocumentFactory {

    @Override

    public Document createDocument() {

        return new PdfDocument();

    }

}

**WordDocumentFactory.java**

package factories;

import documents.Document;

import documents.WordDocument;

public class WordDocumentFactory extends DocumentFactory {

    @Override

    public Document createDocument() {

        return new WordDocument();

    }

}

**DocumentMain.java**

import documents.Document;

import factories.ExcelDocumentFactory;

import factories.PdfDocumentFactory;

import factories.WordDocumentFactory;

public class DocumentMain{

    public static void main(String[] args) {

        Document doc1 = new WordDocumentFactory().createDocument();

        doc1.open();

        Document doc2 = new PdfDocumentFactory().createDocument();

        doc2.open();

        Document doc3 = new ExcelDocumentFactory().createDocument();

        doc3.open();

    }

}

